

## United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/739,457	12/17/2003	Hendrik-Jan Houthoff	570-29 PCT/US/CON	9335
23869	7590 04/07/2005		EXAMINER	
HOFFMANN & BARON, LLP 6900 JERICHO TURNPIKE			SWARTZ, RODNEY P	
SYOSSET, NY 11791			ART UNIT	PAPER NUMBER
·			1645	
			DATE MAILED: 04/07/2005	

. .

Please find below and/or attached an Office communication concerning this application or proceeding.

	Application No.	Applicant(s)	
	10/739,457	HOUTHOFF ET AL.	
Office Action Summary	Examiner	Art Unit	
	Rodney P. Swartz, Ph.D.	1645	
The MAILING DATE of this communication app Period for Reply  A SHORTENED STATUTORY PERIOD FOR REPLY THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.13 after SIX (6) MONTHS from the mailing date of this communication.	Y IS SET TO EXPIRE 3 MONTH(	S) FROM	
<ul> <li>If the period for reply specified above is less than thirty (30) days, a reply</li> <li>If NO period for reply is specified above, the maximum statutory period w</li> <li>Failure to reply within the set or extended period for reply will, by statute, Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b).</li> </ul>	vill apply and will expire SIX (6) MONTHS from , cause the application to become ABANDONE	the mailing date of this communication.  O (35 U.S.C. § 133).	
Status			
1)⊠ Responsive to communication(s) filed on <u>11Ja</u> 2a)⊠ This action is FINAL. 2b)□ This     3)□ Since this application is in condition for allowar closed in accordance with the practice under E	action is non-final. nce except for formal matters, pro		
Disposition of Claims			
<ul> <li>4)  Claim(s) 1-16 is/are pending in the application.</li> <li>4a) Of the above claim(s) is/are withdraw</li> <li>5)  Claim(s) is/are allowed.</li> <li>6)  Claim(s) 1-16 is/are rejected.</li> <li>7)  Claim(s) is/are objected to.</li> <li>8)  Claim(s) are subject to restriction and/or</li> </ul>	vn from consideration.		
Application Papers	·		
9) The specification is objected to by the Examine 10) The drawing(s) filed on is/are: a) accomplished any accomplished may not request that any objection to the Replacement drawing sheet(s) including the correct 11) The oath or declaration is objected to by the Examine	epted or b) objected to by the liderawing(s) be held in abeyance. See ion is required if the drawing(s) is obj	e 37 CFR 1.85(a). ected to. See 37 CFR 1.121(d).	
Priority under 35 U.S.C. § 119			
12) Acknowledgment is made of a claim for foreign a) All b) Some * c) None of:  1. Certified copies of the priority documents 2. Certified copies of the priority documents 3. Copies of the certified copies of the priority application from the International Bureau * See the attached detailed Office action for a list	s have been received. s have been received in Applicati rity documents have been receive u (PCT Rule 17.2(a)).	on No ed in this National Stage	
Attachment(s)			
1) Notice of References Cited (PTO-892) 2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 3) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date	4)  Interview Summary Paper No(s)/Mail Da 5)  Notice of Informal P 6)  Other:		

## **DETAILED ACTION**

1. Applicants' Response to Office Action, received 11January2005, is acknowledged.

Claims 3-5 and 8-14 have been amended.

It is noted that claim 1 is listed as "Original". However, the claim has been improperly amended. Line 2 now reads "he steps of" whereas the original claim 1 recites "the steps of" and line 3 now reads "a) contracting" whereas original claim 1 recites "a) contacting".

2. Claims 1-16 are pending and under consideration.

## **Rejections maintained**

3. The rejection of claims 1-16 under 35 U.S.C. 112, second paragraph, indefiniteness for merely detecting Ag-Ab complexes, is maintained for reasons of record.

Applicants argue that the instant claims do not require that whole *Mycobacterium* per se be detected, only identified. Similarly, the claims are not directed to detecting a whole *Mycobacterium* by adding both the antigen and antibody to a sample, but to detecting immune complexes which permit the identification of the *Mycobacterium* which is or was present in the individual being tested.

The examiner has considered applicants' arguments, and finds it partly persuasive concerning the detection of whole Mycobacterium. However, the examiner does not find it persuasive concerning identifying a species of Mycobacterium if one adds both  $\geq 1$  ImCRAC and  $\geq 1$  antibody which already binds to the ImCRAC. In this embodiment of the claims, the only thing one is identifying is a binding reaction between the added exogenous antibody and ImCRAC.

4. The rejection of claims 1-16 under 35 U.S.C. 112, first paragraph, scope of enablement for all/other species of *Mycobacteria*, is maintained for reasons of record.

Applicants argue that the claims are not directed to particular set or group of *Mycobacterial* species or their particular ImCRACs that are characteristic of a *Mycobacterial* species, but consistent with the ImCRAC technology, can identify and monitor infections due to a range of *Mycobacterial* species.

The examiner has considered applicants' arguments, but does not find them persuasive for the reasons put forth in the original rejection. The instant claims are drawn to a method for identifying any mycobacterial species comprising (a) contacting  $\geq 1$  ImCRAC of a mycobacterial species with a body fluid sample, (b) contacting  $\geq 1$  antibody which is capable of readting with a mycobacterial antigen, with said body fluid sample; and c detecting the presence of antigenantibody complexes, and identifying the Mycobacterium species present in said body fluid sample.

As stated in the original rejection, the instant specification only teaches that M. tuberculosis is identified when one uses M. tuberculosis crude extract and antibodies raised against M. tuberculosis. The specification does not provide sufficient guidance concerning how to identify one species of Mycobacterium by utilizing  $\geq 1$  ImCRAC from another different species of Mycobacterium and utilizing  $\geq 1$  antibody capable of reacting with yet another mycobacterial antigen.

5. The rejection of claims 1-16 under the judicially created doctrine of obviousness-type double patenting as being unpatentable over claims 1-42 of U.S. Pat. No. 6,733,983, is maintained.

Applicants argue that they are obtaining a Terminal Disclaimer from the owner of the instant application.

Application/Control Number: 10/739,457 Page 4

Art Unit: 1645

The examiner has considered applicants argument and the rejection will be maintained until a Terminal Disclaimer has been received.

## Conclusion

6. No claims are allowed.

7. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Rodney P. Swartz, Ph.D., Art Unit 1645, whose telephone number is (571) 272-0865. The examiner can normally be reached on Monday through Thursday from 5:30 AM to 4:00 PM EST.

If attempts to reach the Examiner by telephone are unsuccessful, the examiner's supervisor, Lynette F. Smith, can be reached on (571)272-0864.

The fax phone number for the organization where this application or proceeding is assigned is (571) 273-8300.

Application/Control Number: 10/739,457

Art Unit: 1645

Page 5

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <a href="http://pair-direct.uspto.gov">http://pair-direct.uspto.gov</a>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

RODNEY P SWARTZ, PH.D PRIMARY EXAMINER

Art Unit 1645

March 29, 2005